

## CLAIMS

1. An electromechanical converter, in particular an electric variable transmission, provided with a primary shaft (5) having a rotor (8) mounted thereon, a secondary shaft (7) having an interrotor (15) mounted thereon, and a stator (10), fixedly mounted to the housing (3) of the
- 5 electromechanical converter, wherein, viewed from the primary shaft (5) in radial direction, the rotor (8), the interrotor (15) and the stator (10) are arranged concentrically relative to each other, and wherein the rotor (8) and the stator (10) are designed with one or more mono- or polyphase, electrically accessible windings, characterized in that the interrotor (15)
- 10 forms one whole both mechanically and electromagnetically, and is arranged as a conductor for the magnetic flux in an at least tangential direction.
2. An electromechanical converter according to claim 1, characterized in that in the interrotor (15) comprising an electric and a magnetic circuit, the magnetic circuit is formed by a cylinder having on both sides
- 15 longitudinally extending grooves in which the electric circuit-forming shortcircuit windings extend.
3. An electromechanical converter according to claim 1, characterized in that the interrotor (15) is formed by a magnetic flux conducting cylinder, while on opposite sides thereof permanently magnetic material is applied.
- 20 4. An electromechanical converter according to claim 1, characterized in that the interrotor (15) is formed by a magnetic flux conducting cylinder, while on one side permanently magnetic material is applied and on the other side longitudinally extending grooves are provided in which an electrically accessible winding is provided.
- 25 5. An electromechanical converter according to any one of claims 1-4, characterized in that the stator winding and rotor winding are mutually connected with each other via one or more power electronic converters (12, 13).

6. An electromechanical converter according to claim 5, characterized in that said one or more power electronic converters (12, 13) are electrically accessible via one single electric gate.
7. An electromechanical converter according to any one of claims 1-4,  
5 characterized in that the stator winding and rotor winding are each separately, via a power electronic converter, accessible via an electric gate.
8. An apparatus provided with an electromechanical converter according to any one of claims 1-7 for starting a driving combustion engine.
9. An apparatus provided with an electromechanical converter  
10 according to any one of claims 1-7 for supplying electrical equipment.
10. An apparatus provided with an electromechanical converter according to any one of claims 1-7, characterized in that a system for the storage of energy is incorporated therein.